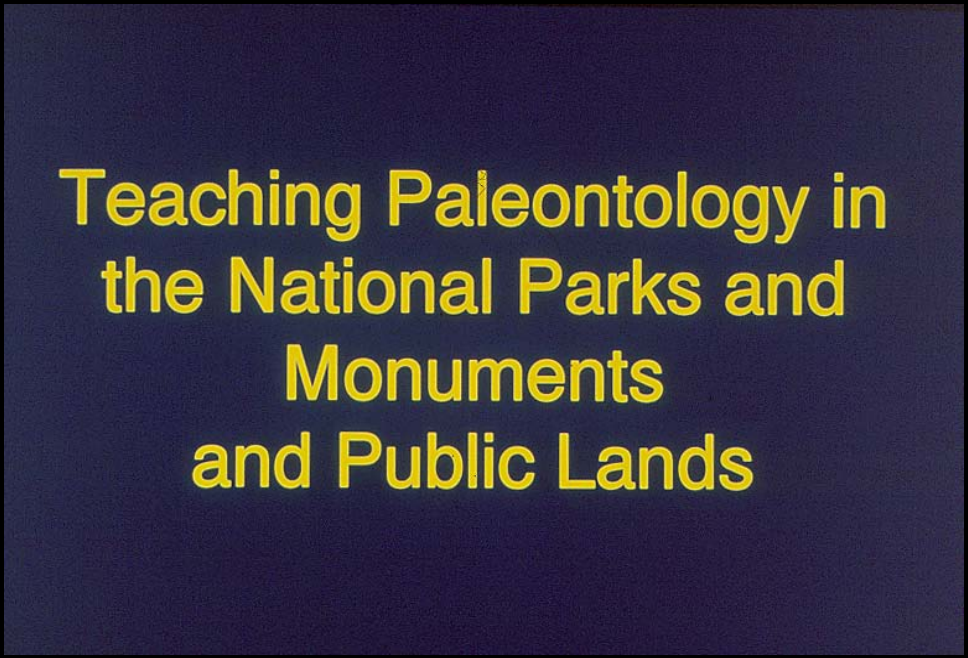
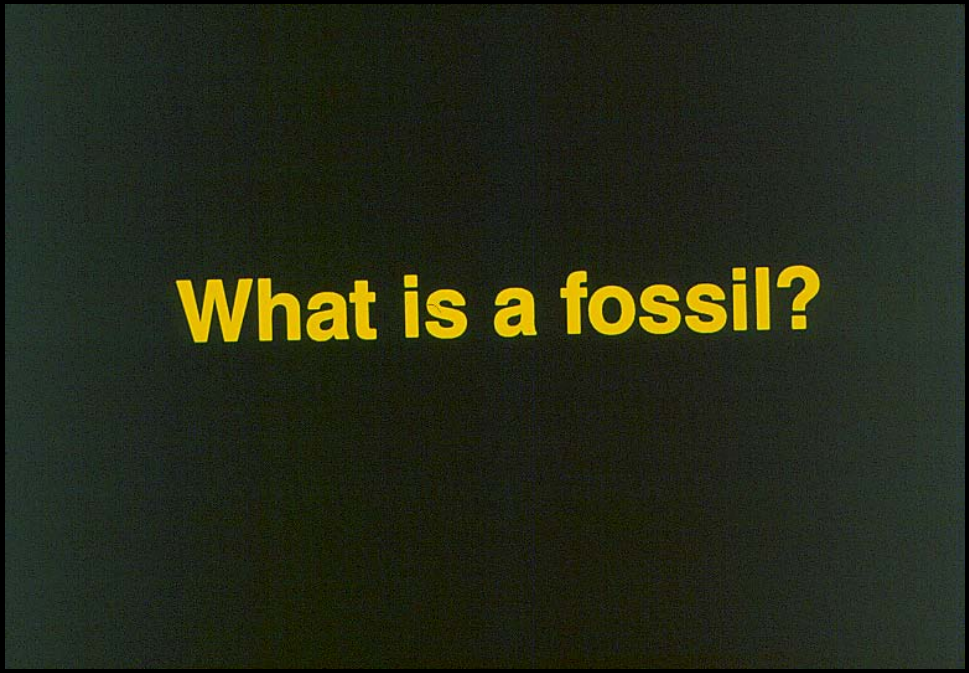


This slide show is made possible through the ongoing efforts of the National Park Service. The NPS is responsible for preserving some of the very special places in our country. Some of those places are beautiful spots in nature and important wildlife habitat. Others are places of historic value, or even prehistoric value, but eight parks were created just to protect fossils. This slide show will look at those eight parks and the different kinds of fossils they protect.



Start Unit 1: What is a fossil?

A fossil is evidence of something that lived long ago. Most fossils are very old. Fossils tell us what life was like at times in the past.

Many fossils are remains of living things, like bones...

or shells...

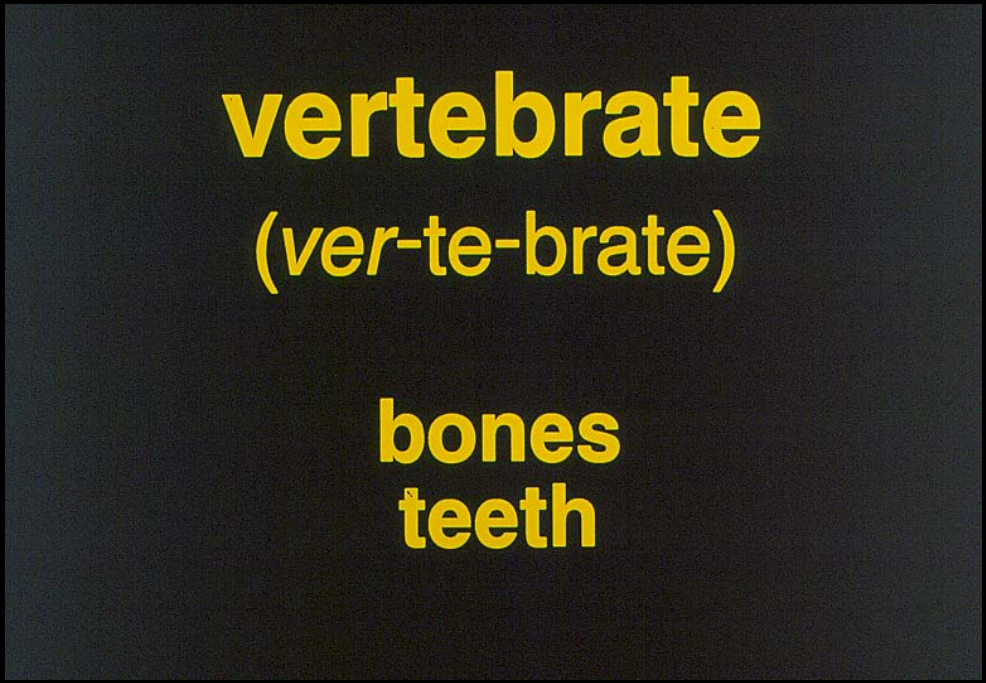
or leaves. This leaf has been preserved in mud. Millions of years later, the mud is now rock.

A fossil can also be a track, like these dinosaur tracks in mud that turned to rock. This is called a trace fossil.

A burrow that filled with mud can also become a trace fossil. We know that an ancient beaver, called Paleocastor, made this burrow because its bones were found inside it. (the fossilized burrow of Paleocastor is called a Daemonelix)

A very special kind of trace fossil is called a coprolite.

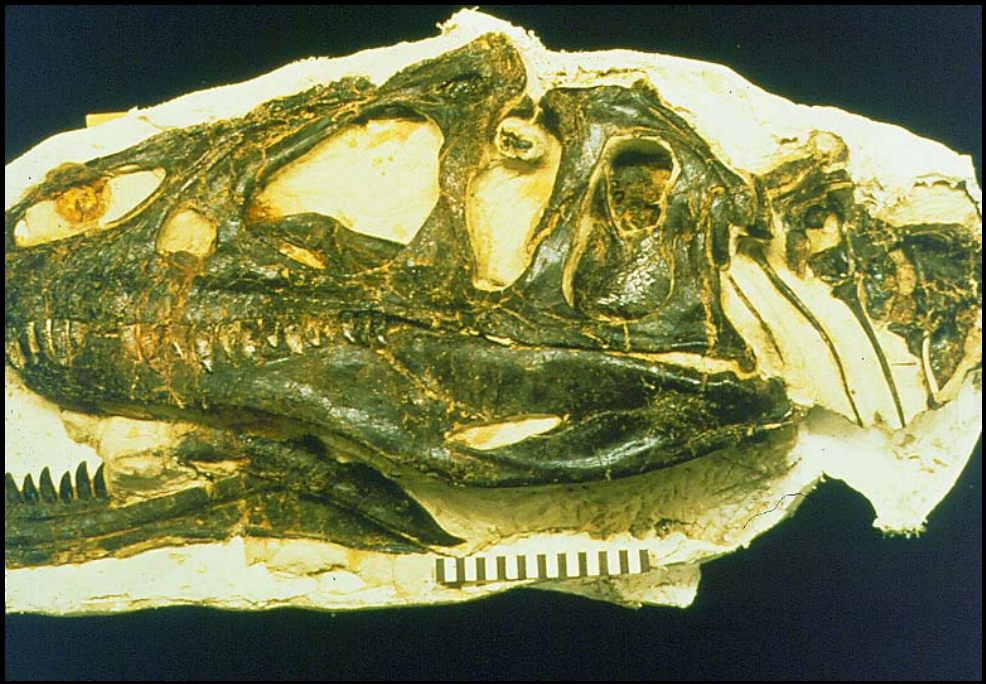
Can you guess what a coprolite is? A coprolite is fossilized dung.



Animals with backbones are called vertebrates. Vertebrate fossils can be bones or teeth...

Like this 30-million-year-old horse.

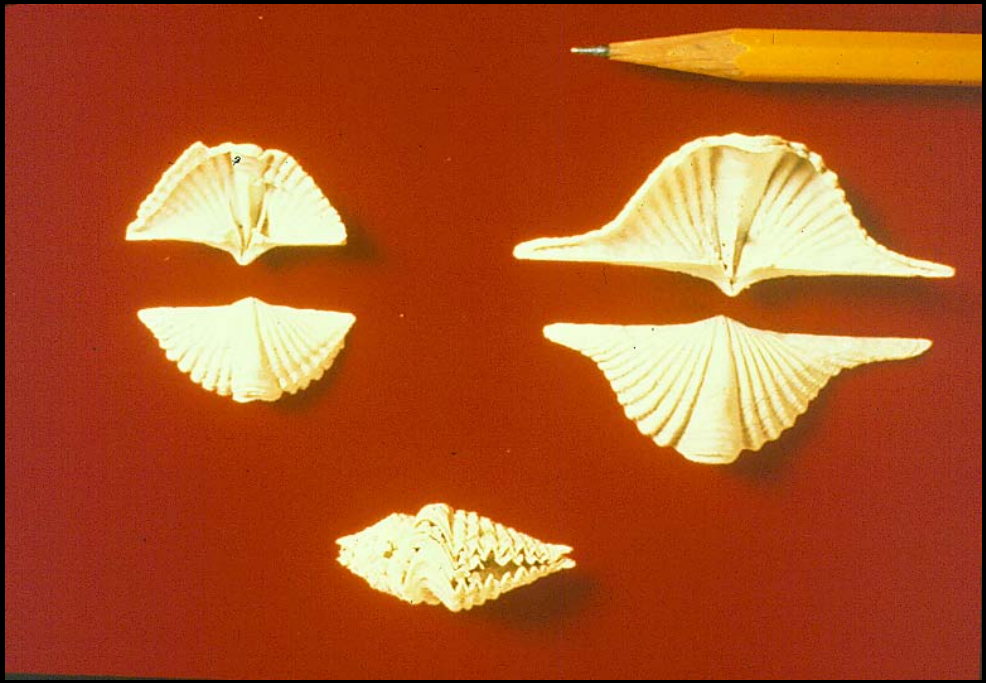
Some vertebrate fossils are very small. Here are parts of an alligator jaw and teeth over 60 million years old.



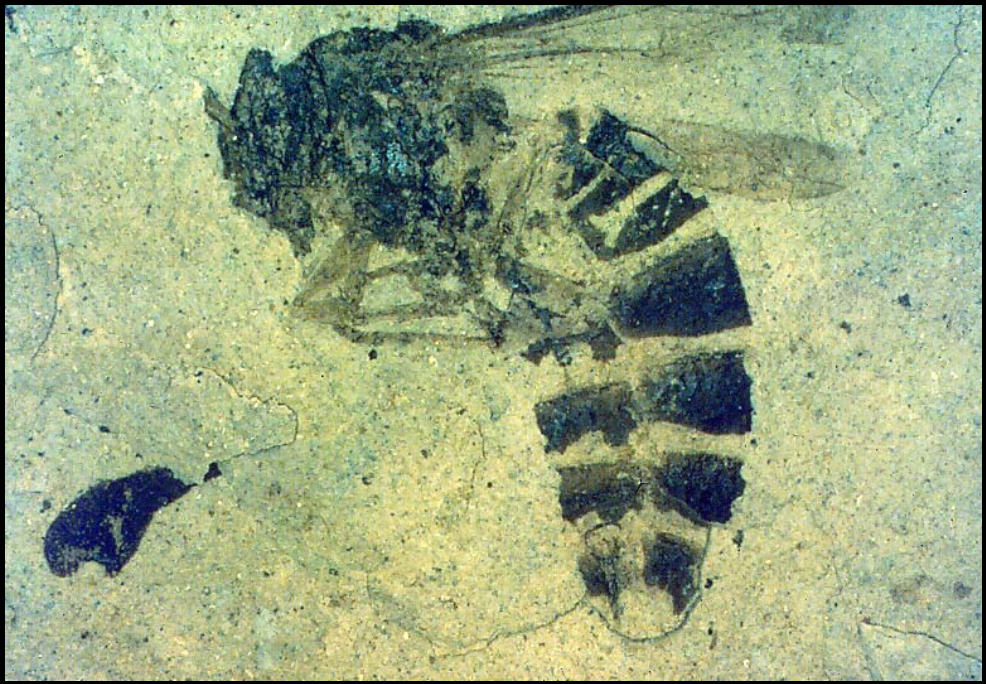
Some vertebrate fossils are very large. Here is the skull of the meat eating dinosaur Allosaurus. The whole body of Allosaurus was almost as big as a school bus!

Animals without backbones are called invertebrates. Invertebrate fossils are remains of invertebrate animals, like...

The shell of a snail…



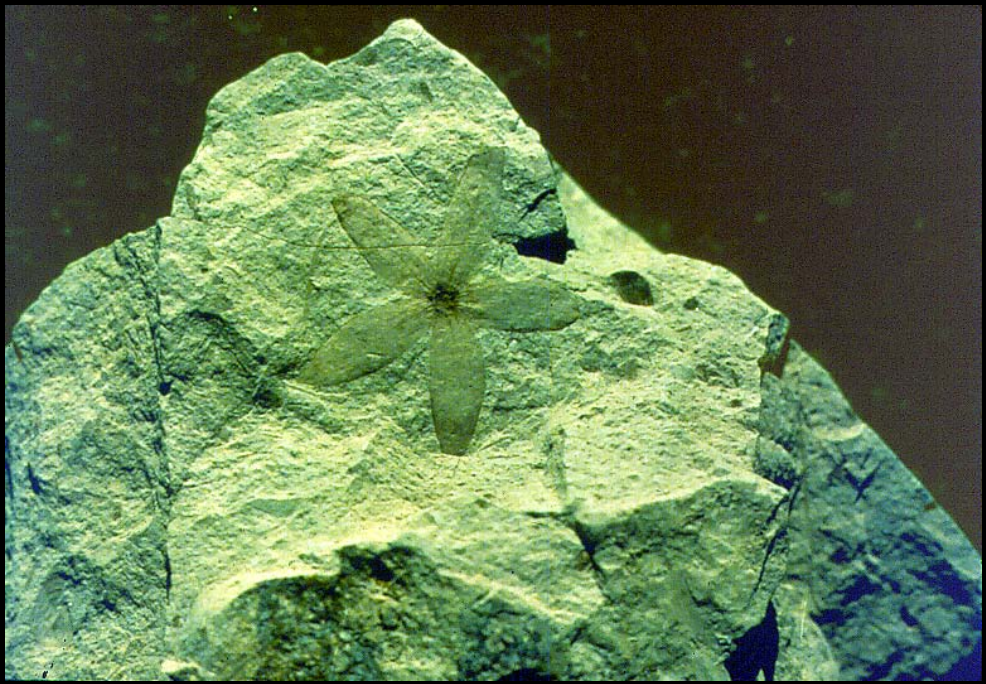
or the shell of a sea creature like a brachiopod...



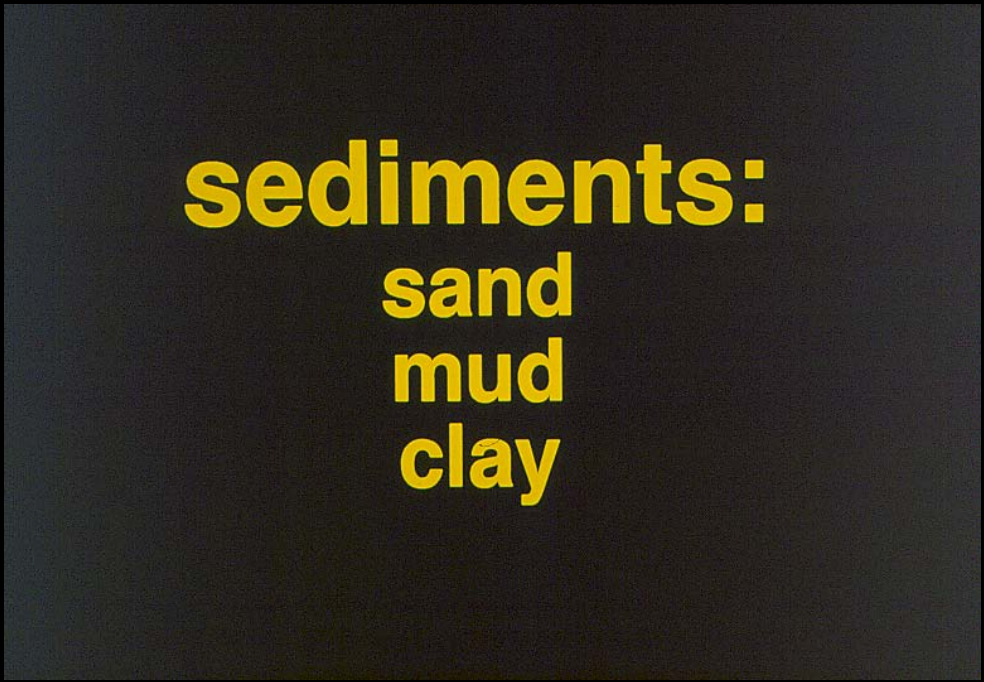
or a whole insect preserved in soft mud.

Plants can also become fossils. Leaves, stems, flowers, seeds, and roots of plants can be preserved as fossils.

Some plant fossils are very well preserved. This pine cone looks like it just feel off the tree. But it is a 30-million-year-old fossil.



Even flowers can become fossils.



Animals and plants become fossils when they die and are buried in sediment. Sediments you're familiar with are mud, sand, and clay.

After a long time, water is squeezed out of the sediment. Minerals like calcite from hard water fill in the spaces and cement the sediments together, turning them into a sedimentary rock. This may also happen to the fossils inside.

The leg of mammoth (a kind of elephant) is preserved in sandstone, a rock made of sand.

This fish is in shale, a rock formed from mud.

A paleontologist is a person who studies fossils. Some paleontologists study invertebrates. Others study vertebrates. Still others study plant fossils or trace fossils.

Paleontologists learn about fossils and then tell other people about them.

They know that fossils can tell us many things about what life on Earth was like thousands or millions of years ago.